

Notice of Allowability

Application No.

10/509,512

Applicant(s)

COSMI, FRANCESCA

Examiner

Abolfazl Tabatabai

Art Unit

2624

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to application filed on September 28, 2004.
2. ☒ The allowed claim(s) is/are 1-12.
3. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) ☒ All b) ☐ Some* c) ☐ None of the:
 1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____
 3. ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
 5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____
 - (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

1. ☒ Notice of References Cited (PTO-892)
2. ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3. ☒ Information Disclosure Statements (PTO/SB/08),
Paper No./Mail Date _____
4. ☐ Examiner's Comment Regarding Requirement for Deposit
of Biological Material
5. ☐ Notice of Informal Patent Application
6. ☐ Interview Summary (PTO-413),
Paper No./Mail Date _____
7. ☒ Examiner's Amendment/Comment
8. ☒ Examiner's Statement of Reasons for Allowance
9. ☐ Other _____

EXAMINER'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it **MUST** be submitted no later than the payment of the issue fee.

The application has been amended as follows:

2. Authorization for this Examiner's amendment was given in a telephone interview with Applicant's Attorney (Mr. Antony P. Venturino with registration # 31,674), on December 11, 2007, without traverse ---.

3. In claim 1, line 4, after material, insert --- **said digital image comprising elementary units**, ---; line 6, after least and before the insert --- **one member of the group consisting of**---; line 7, after presence delete "**or**" insert --- **of matter in said elementary image unit, the**---; line 7, after absence delete "**and/or**" and insert --- **of matter in said elementary image unit, and**---.

4. In claim 2, line 2, after simulations insert--- **at least one member of the group consisting of**---; and after stresses delete "**and/or**" insert --- **and** ---.

5. In claim 3, line 4, after plane insert --- **surfaces** ---; and line 5, after spatial insert --- **volumes**, ---.

6. In claim 4, line 2, after cover insert --- **at least one member of the group consisting of** ---; after entire insert --- **surface** ---; and after examined delete ",", insert --- **and the entire volume of said sample examined**. --- .

7. In claim 5, line 1, after wherein delete **"each of"**; line 2, after cells delete **"is"** insert **--- are---**; line 2, after obtained delete **"from a"** insert **--- assuming each ---**; and after point delete **"assumed at the time"**.
8. In claim 7, line 2, after gray insert **--- scale ---**.
9. In claim 9, line 2, after claim 1 insert **---, wherein said cells define points, lines and surfaces,---**.
10. In claim 10, line 4, after plane insert **--- surfaces ---**; and after spatial insert **--- volumes, ---**.
12. In claim 12, line 2, after gray insert **--- scale ---**.

Drawings

13. The drawings were received on September 28, 2004. These drawings are accepted by the Examiner.

Reasons for Allowance

14. The following is an Examiner's statement of reasons for allowance. The prior art independently or in combination fails to teach or suggest, method to identify the mechanical properties of a material comprises constructing a grid of elementary geometric elements, or cells, able to be associated with said digital image, assigning, for each of said cells, an index representative of the characteristics of the type of matter that occupies the position of a relative cell in relation to the parameters possessed by

the elementary image units associated with such cell and determining the mechanical properties of said material on the basis of numerical simulations carried out using the cell method in combination into other elements and features of claim 1.

15. Claims 1-12 are allowed.

Citation of Relevant Prior Art

16. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Vaillant et al (U. S. 6,320,928 B1) disclose method of reconstruction of a three-dimensional image of an object.

Prokoski (U. S. 6,529,617 B1) discloses method and apparatus for positioning an instrument relative to a patients body during a medical procedure.

Cann et al (U. S. 5,172,695) disclose method for improved predication of bone fracture risk using bone mineral density in structural analysis.

Contact Information

17. Any inquiry concerning this communication or earlier communications from the Examiner should be directed to ABOLFAZL TABATABAI whose telephone number is (571) 272-7458.

The Examiner can normally be reached on Monday through Friday from 9:30 a.m. to 7:30 p.m. If attempts to reach the Examiner by telephone are unsuccessful, the Examiner's supervisor, Bhavesh Mehta, can be reached at (571) 272-7453. The fax

Application/Control Number:
10/509,512
Art Unit: 2624

Page 5

phone number for organization where this application or proceeding is assigned is (571) 273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Abolfazl Tabatabai

Patent Examiner

Technology Division 2624

January 7, 2008

A-Tabatabai